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WHAT A ROYAL PLANT IS COTTON

Highest Notch In January Ever Known Except War Times

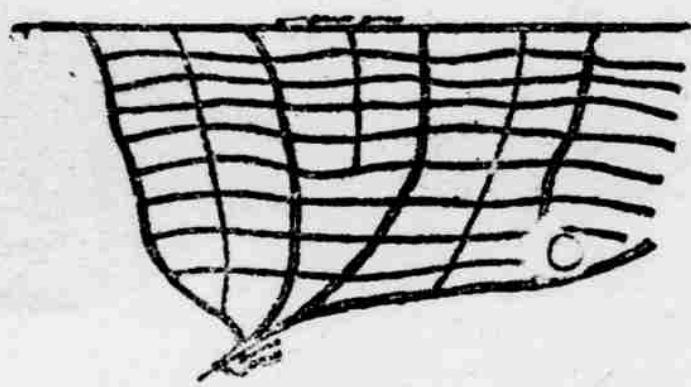
By HENRY W.

What a royal plant it is! The world waits in attendance on its growth. The shower that falls whispering on its leaves is heard around the earth. The sun that shines upon it is tempered by the prayers of all people. The frost that chills it, and the dew that descends from the stars are noted, and the trespass of a little worm on its green leaf is more to England than the advance of the Russian army on her Asiatic outposts. It is gold from the instant it puts forth its tiny shoot. Its fiber is current in every bank; and when loosing its fleeces to the sun, it floats a sunny banner that glorifies the field of the humble farmer. That man is marshaled under a flag that will compel the allegiance of the world and wring a subsidy from every nation on earth. It is the heritage that God gave to this people forever as their own, when he arched our skies, established our mountains, girt us about with the ocean, loosed the breezes, tempered the sunshine and measured the rain. Ours and our children's forever. As princely a talent as ever came from His hand to mortal stewardship.

SCIENTIFIC METHODS OF IRRIGATING ALFALFA

The Government Has Published in Bulletin Form the Results of Extensive Investigations Made in a Number of States.

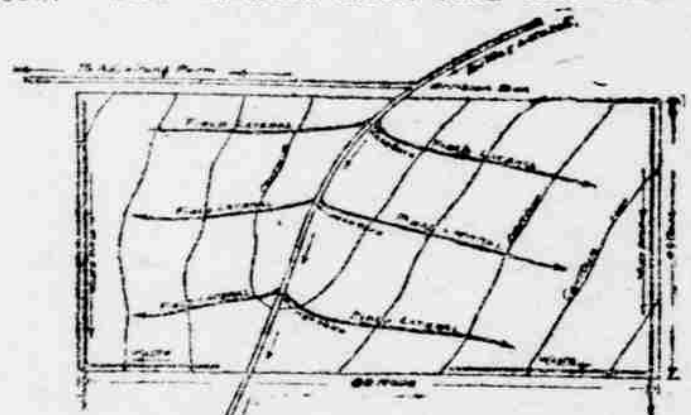
Experience in the growing of alfalfa for more than 2,000 years shows that it thrives best in the soil and climate of arid and semi-arid regions. The abundant sunshine, the warmth, and the deep, rich soil prevailing throughout the western half of the United States seem to be well suited to its requirements, and over half a century's experience has shown that there is comparatively little cultivable land



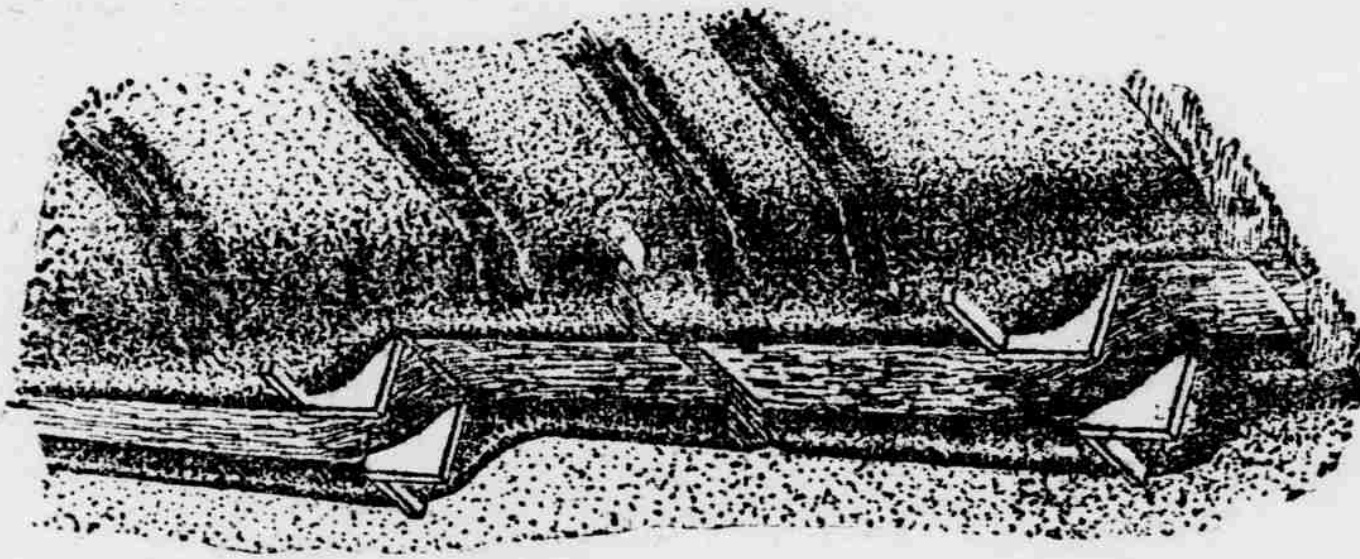
California Method of Laying Out Contour Checks.

in the west on which it cannot be grown. One finds the same varieties flourishing in Imperial valley, California, 100 feet below sea level, and maintaining a sturdy growth on the San Luis plains of Colorado, 7,500 feet higher. Alfalfa makes a remarkable growth in the warm sunshine of Arizona, yet it is rarely injured by cold in Montana.

One cannot well overestimate the importance of alfalfa to western farmers. The alfalfa field and the alfalfa



20-Acre Alfalfa Field Near Berthoud, Col., Showing Supply Lateral, Field Laterals, Contours and the Waste Ditches.

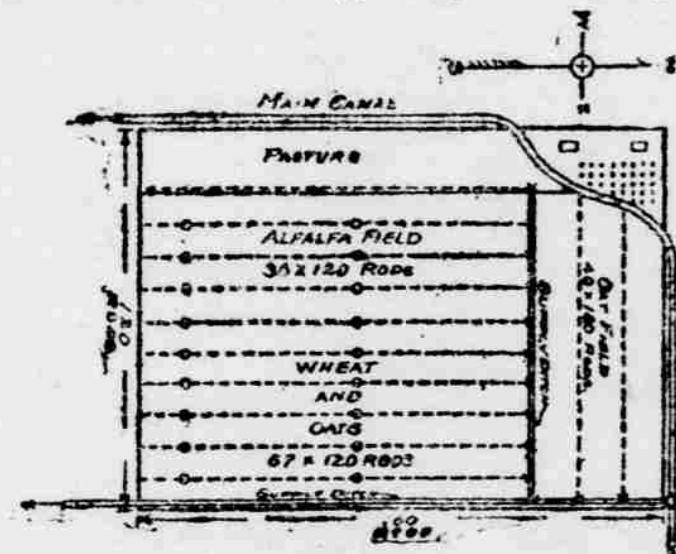


Manner of Placing Tubes in Ditch Bank for Furrow Irrigation.

stack provide the best means of protecting stock against enormous losses by starvation when the excellent pasturage available throughout the greater part of the year fails either through drought in midsummer or by being covered with deep snow in midwinter. A single ton of alfalfa may save the lives of many head of stock by providing feed during short periods of cold, stormy weather. Alfalfa cannot be excelled as a preparatory crop on soils that have long been unproductive. Likewise, it maintains the fertility of soils naturally rich in plant food, and if used as a base of rotation makes possible abundant crop yields of various kinds. In 1906 the chemists of the Colorado experiment station estimated the fertilizing value of the stubble and roots of mature plants at \$35 per acre when measured by the commercial value of artificial fertilizers on the market. Moreover, the yields are exceptionally high when irrigation, favorable climate conditions and proper treatment are combined. Seven tons of cured hay at three cuttings are obtained from the best fields of Montana, while frequently nine tons in five cuttings are harvested in California. This large tonnage, together with its high feeding value and the fact that it is consumed by practically all farm animals, makes

it not only a convenient and useful crop to the grower, but a highly profitable one as well.

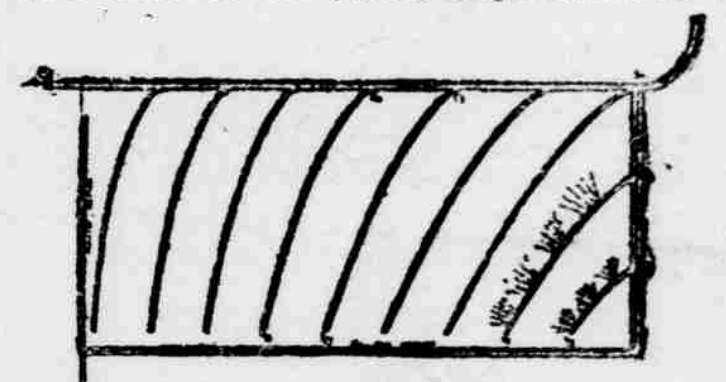
Notwithstanding its present importance and great value in irrigation farming, the profits on the area now in alfalfa can be greatly increased if



120-Acre Subirrigated Farm of C. H. De Camp, Twelve Miles South of Et. Anthony, Idaho.

more care and skill are exercised in growing it. The western irrigator has seldom been able, financially, to dig his ditches and prepare his fields in such a way as to insure the most efficient irrigation and the highest profits. In consequence valuable water is wastefully applied to land that is

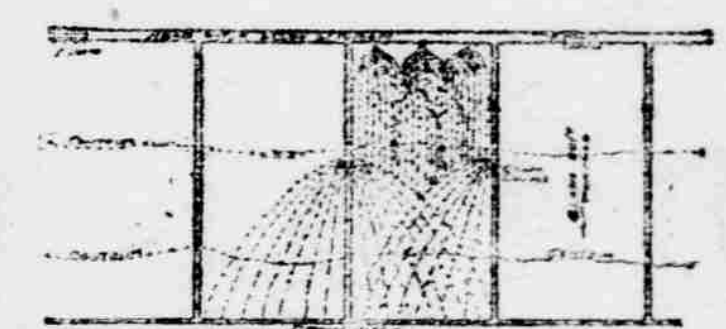
in no fit condition to be irrigated. On the large acreage in irrigated alfalfa this amounts to an enormous loss. This fact, considered in connection with the importance of this crop, the rapidly increasing area devoted to its growth and the large number of farmers who are settling in the west and who will be for years dependent in a



Preparing Land for Flooding in Montana.

large measure on alfalfa for a livelihood, would seem to warrant the collection and publication of any information designed to improve the present practice.

It has warranted the collection and



Drain Ditch Flooding From Head Ditches in Wyoming.

publication by the government of a great deal of very valuable information secured to improve the present practice of irrigation.

This has been done in Farmers' Bulletin No. 373 and any one who is interested in the irrigation of alfalfa may procure one of these valuable bulletins free of cost by writing to Samuel Fortier, chief of irrigation investigations, United States Department of Agriculture, Washington, D. C.